



UNITED STATES PATENT AND TRADEMARK OFFICE

UNITED STATES DEPARTMENT OF COMMERCE
United States Patent and Trademark Office
Address: COMMISSIONER FOR PATENTS
P.O. Box 1450
Alexandria, Virginia 22313-1450
www.uspto.gov

APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/685,090	10/11/2000	Abel C. Dasylva	57983.000005	3422
7590	12/19/2003		EXAMINER	
Thomas E. Anderson Hunton & Williams 1900 K Street, NW Washington, DC 20006			PHAN, HANH	
			ART UNIT	PAPER NUMBER
			2633	
DATE MAILED: 12/19/2003				(3)

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	09/685,090	DASYLVA ET AL.	
	Examiner Hanh Phan	Art Unit 2633	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) Responsive to communication(s) filed on 11 October 2000.
- 2a) This action is FINAL. 2b) This action is non-final.
- 3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) Claim(s) 1-24 is/are pending in the application.
 - 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) Claim(s) _____ is/are allowed.
- 6) Claim(s) 1-4,6-8,10-12 and 14-24 is/are rejected.
- 7) Claim(s) 5,9 and 13 is/are objected to.
- 8) Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) The specification is objected to by the Examiner.
- 10) The drawing(s) filed on _____ is/are: a) accepted or b) objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. §§ 119 and 120

- 12) Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
 - a) All b) Some * c) None of:
 1. Certified copies of the priority documents have been received.
 2. Certified copies of the priority documents have been received in Application No. _____.
 3. Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.
- 13) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application) since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.
 - a) The translation of the foreign language provisional application has been received.
- 14) Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121 since a specific reference was included in the first sentence of the specification or in an Application Data Sheet. 37 CFR 1.78.

Attachment(s)

- | | |
|---|--|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) Paper No(s). _____ . |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449) Paper No(s) _____ . | 6) <input type="checkbox"/> Other: _____ . |

DETAILED ACTION

Claim Rejections - 35 USC § 102

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

2. Claims 1-4, 6-8, 10-12, and 14-24 are rejected under 35 U.S.C. 102(e) as being anticipated by Chang et al (US Patent No. 6,525,850).

Regarding claims 1 and 19, referring to figures 1-4, 6 and 7, Chang discloses a method for routing data within an optical network having a plurality of network nodes, the method comprising the steps of:

receiving data at a first network node (Fig. 2) via a first optical signal having a first wavelength, the first wavelength corresponding to a first optical frequency, the first optical frequency being mapped to a first binary representation, the first binary representation being divided into a first plurality of fields, at least one of the first plurality of fields corresponding to a routing label in a first label stack; a top routing label in the first label stack indicating a second network node; and

based at least partially upon the top routing label, transmitting the data from the first network node to the second network node via a second optical signal having a second wavelength (from col. 8, line 29 to col. 14, line 64).

Regarding claim 2, Chang further teaches the step of: popping the top routing label off the first label stack so as to promote a next routing label in the first label stack (Figs. 1-4, 6 and 7).

Regarding claims 3, 7 and 11, Chang further teaches the second wavelength corresponds to a second optical frequency, the second optical frequency being mapped to a second binary representation, the second binary representation being divided into a second plurality of fields, at least one of the second plurality of fields corresponding to a routing label in a second label stack, a top routing label in the second label stack indicating a third network node (Figs. 1-4, 6 and 7).

Regarding claims 4 and 10, Chang further teaches the top routing label in the second label stack corresponds to the next routing label in the first label stack (Figs. 1-4, 6 and 7).

Regarding claims 6, 8 and 12, Chang further teaches the step of: swapping the top routing label in the first label stack with a new routing label when the first label stack contains more than two routing labels (Figs. 10 and 12).

Regarding claims 14, 15 , 20 and 21, Chang further teaches the first wavelength is the different from the second wavelength (Figs. 1-4, 6 and 7).

Regarding claims 16 and 22, Chang further teaches at least another one of the first plurality of fields corresponds to a termination field indicating an end of the first label stack (Figs. 1-4, 6 and 7).

Regarding claims 17 and 23, Chang further teaches at least another one of the first plurality of fields corresponds to a contention field for differentiating the first wavelength from a third wavelength (col. 4, lines 9-41, col. 6, lines 11-34 and col. 11, lines 40-64).

Regarding claims 18 and 24, Chang further teaches the data is a first data, wherein second data is received at the first network node via a third optical signal having the third wavelength, and wherein the first optical signal and the third optical signal have similar routing paths through the network (col. 4, lines 9-41, col. 6, lines 11-34 and col. 11, lines 40-64).

Allowable Subject Matter

3. Claims 5, 9 and 13 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

Conclusion

4. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure.

Schlafer et al (US Patent No. 5,253,250) routing and switching.

Barnsley (US Patent No. 5,488,501) discloses optical processing system.

Fatehi et al (US Patent No. 6,600,583) discloses optical internet router.

Elahmadi et al (US Patent No. 6,292,464) discloses apparatus and method for self routing.

Monacos (US Patent No. 6,101,013) discloses optical circuit switched protocol.

5. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Hanh Phan whose telephone number is (703)306-5840.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Jason Chan, can be reached on (703)305-4729. The fax phone number for the organization where this application or proceeding is assigned is (703)872-9306.

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the receptionist whose telephone number is (703)305-4700.



Hanh Phan

12/10/2003